27

UNITED
NATIONS

A

General Assembly

Distr.
GENERAL

A/CONF.157/4
11 June 1993

ENGLISH
Original: ARABIC/FRENCH

WORLD CONFERENCE ON HUMAN RIGHTS
Vienna, 14-25 June 1993
Item 10 of the provisional agenda

CONSIDERATION OF THE RELATIONSHIP BETWEEN DEVELOPMENT, DEMOCRACY AND THE UNIVERSAL ENJOYMENT OF ALL HUMAN RIGHTS, KEEPING IN VIEW THE INTERRELATIONSHIP AND INDIVISIBILITY OF ECONOMIC, SOCIAL, CULTURAL, CIVIL AND POLITICAL RIGHTS

Note verbale dated 1 June 1993 from the Permanent Mission of Iraq to the United Nations Office at Geneva addressed to the Secretary-General of the World Conference on Human Rights

The Permanent Mission of Iraq to the United Nations Office at Geneva presents its compliments to the Secretary-General of the World Conference on Human Rights and has the honour to request him to consider the attached document relating to the impact of the economic blockade on health and the environment in Iraq and its repercussions on development and human rights as an official document under item 10 of the provisional agenda of the World Conference on Human Rights to be held in Vienna.

Impact of the economic blockade on the health, nutritional and environmental situation in Iraq; its repercussions on development, democracy and human rights

1. The Government of Iraq wishes to draw the attention of the international community to the grave violations of Iraqi citizens' human rights resulting from the continued economic blockade, on the basis of the principle of the interdependence of civil, political, economic, social and cultural human rights as emphasized by United Nations resolutions, the most recent one being General Assembly resolution 47/137.

2. A simple review of the figures contained in this document will reveal, without a shadow of a doubt, systematic violations of Iraqi citizens' right to life caused by grave shortages of food and medicines resulting from the all-out economic blockade imposed on the Iraqi people, which clearly affects economic and social development in Iraq and thus hampers the much-needed building of institutions for the democratic process and the enjoyment by Iraqis of their civil and political rights.

3. We hope that the international community will fulfil its responsibility to end these violations, which are being perpetrated in the name of the international community and international law, on humanitarian grounds.

4. Essential medical services have been greatly affected by the economic blockade, owing to the scarcity of medicines and medical supplies, including medical apparatus, x-ray films and laboratory products. Besides, 90 per cent of the existing equipment has been out of order for lack of spare parts. The low level of medical services has had considerable negative effects on patients' health, leading to many deaths: the number of patients who died as a result of the situation reached 98,669 in 1991, increasing in 1992 to 123,463. The number of beds either in use or ready for use decreased by 15 per cent in comparison with the number of such beds prior to 2 August 1990. In spite of the fact that the resolution adopted by the Security Council and the Sanctions Committee allows Iraq to use its funds frozen in banks throughout the world for the purchase of medicines and food, most of the States where such funds are held have prevented the banks from accepting open credit-lines made available for medicines and medical supplies by the Central Bank of Iraq. In 1991 those funds amounted to about $265 million, whereas prior to the Gulf War Iraq used to import medical supplies costing some $600 million a year. That is the reason for the sharp drop in the funds available for medicines, leading to so many deaths among those who have been victims of this blockade.

5. The health of the Iraqi citizen is at present threatened by increasing threats to the environment, lack of access to medical treatment and inadequate nutrition. Public health programmes have cut back their activities because of short supplies; hospitals and public health centres lack medicines as well as medical supplies, surgical equipment and dental equipment, and laboratories need spare parts and chemicals for maintenance.

6. The economic blockade has led to the stoppage of all medical shipments and equipment from foreign manufacturers which had contracts with the Health Ministry prior to 2 August 1990. Despite the fact that part of those medical purchases had been paid for in advance before the incidents of 2 August 1990, the suppliers have not dispatched them, which has led to notable scarcity in this area.

7. The aggression perpetrated by the alliance and the riots following that aggression caused extensive damage to buildings and property owned by health institutions. Some 429 hospitals and health centres were affected, with the damage totalling 250 million dinars, or the equivalent of $750 million, and considerable damage was caused to buildings, medicines, medical supplies and apparatus, ambulances and vehicles used by other health institutions, hospital furniture and other basic medical equipment.

8. The aggression destroyed the infrastructure needed for the protection and improvement of the environment, including the sewage and water purification systems which has led to the spread of epidemics such as typhoid, malaria and other diseases. The estimated cost of combating these epidemics has reached 35 million dinars, or the equivalent of $120 million.

9. If any appraisal of the grave future consequences stemming from the economic blockade imposed on the Iraqi society is to be objective, it has to provide statistics on the percentage of children in Iraqi society, in order to show the serious effects of the economic blockade in terms of child malnutrition and increasing infant mortality.

Estimated numbers of Iraqi children by age groups during the period 1987-1995

Age group	1987		1992		1995	
	No. of children	%	No. of children	%	No. of children	%
0-1	566 447	5.3	736 000	3.9	775 000	3.9
1-4	2 198 386	13.5	2 208 000	12.0	2 325 000	11.9
5-9	2 468 250	15.1	2 688 000	14.6	2 777 000	13.9
10-14	2 148 409	13.2	2 462 000	13.4	2 616 000	13.1
Total children	7 381 492	45.3	8 094 000	43.9	8 493 000	42.5
Total population of Iraq	16 335 199		18 422 000		19 997 000	

10. The estimates in this table show the high percentage of children in Iraq as compared with other States: children account for nearly 50 per cent of the total number of inhabitants. The fact that this huge section of the population is suffering from malnutrition and increasingly high mortality clearly demonstrates a wilful intent to destroy Iraqi society. When we add to

children (43.9 per cent) women over the age of 15 (28 per cent) and persons over the age of 60 (5.5 per cent), the total percentage of children, women and the elderly stands at nearly 77 per cent. Taken together these figures give a clear indication of the grave damage Iraqi society, especially women, children and the elderly will incur in the future. This confirms that it is the intention of the States which insist on keeping up the blockade to commit genocide against the Iraqi people, as defined in the Convention on the Prevention and Punishment of the Crime of Genocide of 1948.

11. Owing to a variety of interrelated factors, infant and child mortality increased considerably following the Gulf war. First, there is a severe shortage of food and basic medicines as well as drinking water. Second, poor medical services have led to an increase in diseases resulting from polluted water, such as cholera, typhoid, dysentery and gastritis. (See tables 1 and 2, which provide an indication of the total number of deaths due to the economic blockade in the age groups of under and over five years old caused by selected factors).

Table 1

Total deaths due to the economic blockade caused by selected factors
(By period and age group)

Period		Age group		Total
		Less than 5 years	Over 5 years	
1990*		2 560	9 167	12 727
1991		27 472	58 469	85 942
1992		46 922	76 520	122 462
1993	January-April	15 884	26 722	42 606
Total		92 850	170 888	264 738

* The total for 1990 covers the period from August to December.

Table 2

Deaths due to the economic blockade in the under-5 age group caused by selected factors

Period		Rate of monthly deaths
1990 1991 1992		712 2 289 3 911
1993	January	5 192
	February	4 052
	March	3 409
	April	3 311

Deaths due the economic blockade in the over-5 age group caused by selected factors

Period		Rate of monthly deaths
1990 1991 1992		1 822 4 872 6 377
1993	January	6 545
	February	6 288
	March	6 663
	April	7 226

12. For infants and children malnutrition is the basic problem. The shortage of food and the spread of gastritis have contributed greatly to the incidence of malnutrition diseases, as shown by the considerable increase in the number of under-weight children born. (See tables 3 and 4).

Table 3

Impact of economic blockade on nutritional situation of children under five

Nature of case	1990		1991			1992			1993		
	Number of cases	Monthly rate	Number of cases	Monthly rate	Ratio to 1990	Number of cases	Monthly rate	Ratio to 1990	Number of cases for January-April	Monthly rate	Ratio to 1990
Kwashiorkor	485	41	12 793	1 066	26.3	12 744	1 145	27.9	4 871	12 018	29.7
Marasmus	5 193	423	96 186	8 015	18.5	111 477	9 289	21.4	43 732	1 922	25.2
Other types of malnutrition due to protein, calorie or vitamin deficiency	96 809	8 063	947 974	78 998	9.8	1 123 219	23 610	11.6	383 015	95 754	11.9
Total cases	102 487	8 541	1 056 956	880 079	10.3	1 248 540	104 045	12.1	421 618	107 904	12.6

Table 4

Percentage of babies weighing under 2.5 kilos in total number of babies registered at health institutions during the period of economic blockade

Period		Monthly rate %
1990		4.5
1991		10.8
1992		17.6
1	January	18.6
9	February	19.2
9	March	18.9
3	April	20.2

13. There has also been a proliferation of diseases such as typhoid, gastritis and cholera resulting from the use of polluted water. Hepatitis has spread considerably in all parts of Iraq, increasing by 100 per cent in some parts of the country. Meningitis is now common in the south of Iraq. As a result of the damage suffered by children's vaccine programmes, such diseases as measles and poliomyelitis have reappeared. Health facilities have suffered from shortages and are functioning below their pre-war capacity, because most of them lack even basic medical supplies, such as vaccines, antibiotics and anaesthetics. Severe shortage of medicines prevents treatment of stomach disorders, the chemical needed for the treatment of typhoid being either scarce or unavailable. There is a scarcity of the liquids needed for the treatment of dehydration suffered by persons with cholera or gastritis and of the antibiotics needed to cure meningitis. Lack of vaccines and precarious health conditions have led to the re-emergence of children's diseases such as poliomyelitis, measles and dysentery, which had been previously brought under control through vaccine programmes. (See table 5).

Table 5

Impact of economic blockade on incidence of contagious disease in Iraq

Type of disease	1989	1990		1991		1992	
		No. of cases	Ratio of 1990 to 1989	No. of cases	Ratio of 1991 to 1989	No. of cases	Ratio of 1992 to 1989
Polio-myelitis	10	56	5.6	186	18.6	120	12
Diphtheria	96	168	1.75	511	5.4	369	3.8
Pertussis	368	489	1.2	1 527	4.1	1 601	4.3
Measles	5 715	7 524	1.3	11 358	1.9	20 160	3.5
German measles	514	692	1.3	2 848	5.5	1 663	3.2
Neonatal tetanus	42	393	9.2	936	22.2	233	5.5
Tetanus	32	87	2.7	933	29.1	98	3
Pneumonia	6 612	11 713	1.7	23 529	3.5	17 277	2.6
Mumps	9 629	15 963	1.6	22 718	2.3	23 883	2.4
Cholera	0	0	0	1 217	1 217	9 076	9 076
Typhoid	1 812	2 240	1.2	17 524	9.6	19 276	10.6
Giardia	72 416	112 222	1.5	501 391	6.8	596 356	8.1
Amoebic Dysentery	19 615	32 957	1.6	58 311	2.9	61 939	3.1
Viral Hepatitis	1 816	3 228	1.7	11 135	6.1	12 766	7.5
Meningitis	2 559	1 510	0.70	5 792	2.3	4 524	1.8
Endemic Malaria (paludism)	3 428	3 924	1.1	7 105	2	5 525	1.6

Table 5 (continued)

Type of disease	1989	1990		1991		1992	
		No. of cases	Ratio of 1990 to 1989	No. of cases	Ratio of 1991 to 1989	No. of cases	Patio of 1992 to 1989
Baghdad boil	1 829	1 894	1	8 233	4.5	8 779	4.8
Black fever	491	576	1.1	3 713	7.5	3 866	7.8
Haemorrhagic fever	38	42	1.1	196	5.1	65	1.7
Maltese fever	2 464	2 816	1.1	13 106	5.3	14 546	5.9
Toxoplasmosis	372	512	1.3	2 223	5.9	2 745	7.3
Hydrocele	370	406	1	1 787	4.8	1 991	5.3
Scabies	0	198	198	1 892	1 892	7 956	7 956
Rabies	25	37	1.4	456	10.2	84	3.3

14. The economic blockade has had a devastating effect on major surgical operations and laboratory tests. (See tables 6, 7 and 8).

Table 6

Impact of economic blockade on major surgical operations

Period		Monthly rate	Percentage decrease compared to 1989
1989		15 125	--
1990		8 668	- 43
1991		6 507	- 57
1992		5 477	- 63.7
1	January	4 938	- 67.3
9	February	5 011	- 66.8
9	March	4 992	- 67
3	April	5 254	- 65.2

Table 7

Impact of economic blockade on laboratory tests

Period		Monthly rate	Percentage decrease compared to 1989
1989		1 414 050	-
1990		1 091 230	- 27
1991		635 446	- 57
1992		589 952	- 60.5
1	January	589 998	- 60.5
9	February	592 160	- 60.2
9	March	591 371	- 60.4
3	April	581 590	- 61

Table 8

Impact of economic blockade on laboratory tests

Type of test	1989		1990		1991		1992		1993			
	Number of tests	Monthly rate	Number of tests	Monthly rate	Number of tests	Monthly rate	Number of tests	Monthly rate	January	February	March	April
Clinical chemistry	4 203 198	350 258	3 116 910	250 742	1 617 151	134 762	1 555 790	121 316	127 909	125 166	126 048	118 992
Bacteriological	1 008 264	84 022	666 585	55 548	216 421	26 368	261 274	21 773	23 719	22 049	23 364	23 205
Blood diseases	5 180 829	431 726	4 361 059	363 421	2 536 919	21 141	2 385 432	198 786	204 195	206 237	129 683	195 619
Tests by blood bank	2 213 330	184 444	1 199 629	99 970	811 606	67 624	726 167	60 514	54 446	58 709	58 868	60 574
Serological	711 553	59 321	486 243	40 520	280 929	23 411	214 703	17 892	13 943	14 721	17 456	20 429
Cytological	355 266	29 605	200 679	1 723	6 877	573	5 786	482	369	393	442	411
Biopsies	Figures unclear in original											
Other	4 059 516	338 293	3 207 108	267 259	2 024 751	169 562	2 012 782	317 732	163 835	164 342	164 174	160 891
Total	17 928 804	1 494 050	13 094 763	1 091 230	7 625 354	635 446	7 079 420	589 952	589 999	593 160	591 371	581 590

Impact of the economic blockade on prices and living standards

15. The economic structure of Iraq, an oil producer, is based on imports, which have played a crucial role in guaranteeing the essential elements in the balance of the economy.

16. The blockade has been aimed directly at preventing Iraq from exporting, so as to deprive it of sources of foreign currency, freeze its assets and deny its private and public enterprises access to loans and credit facilities, thus making any imports impossible for lack of financing. In this way Iraq has been prevented from taking advantage of the quotas of foodstuffs and medicines authorized by the Security Council.

17. Local production declined in all sectors by some 54 per cent in 1991 as compared with 1990. This fall was due not just to the cessation of exports of crude oil, phosphates and sulphur, but also to the acute shortage of raw materials and semi-finished products which Iraq gets from abroad. Construction is held back for the same reasons, and the downturn in production activities should continue in 1993. As the blockade has continued, the country has been falling further and further behind in the replacement, renovation and maintenance of machinery and transport facilities and in the purchase of spare parts.

18. Locally produced foodstuffs and medicines can only meet a very small proportion of the demand, and all efforts to increase output come up against the obstacles raised by the blockade itself. Thus the seed needed by agriculture is imported, and locally produced fertilizers are not adequate to meet the need to boost agricultural production. In addition, equipment, tools and spare parts for the agricultural sector are not obtainable locally, which means more and more material is out of service.

19. The shortage of food supplies, particularly grain, should thus continue. Livestock production should also fall heavily, for lack of feedstuffs and veterinary products. Output of white meat, for example, fell from 2.1 million tons in 1990 to 0.33 million tons in 1991, and output of fresh eggs dropped from 631 million to 339 million over the same period.

20. The decline in production has led to a rise in unemployment among new graduates and a shrinking of the labour market, which has particularly affected women. A logical consequence of the fall in imports and local production has been a sharp decline in the supply of goods, which has inevitably led to a steady rise in general price levels and widespread speculation, a phenomenon which feeds inflation in its turn. It should be noted that depriving Iraq of sources of foreign exchange and freezing its assets has prevented the competent bodies from having access to the currency market, which has contributed to a spectacular rise in exchange rates as the Iraqi dinar has crumbled. As a result, the inflationary pressure which has affected and is still affecting the price of imported goods and their local substitutes has spread to the economy as a whole and has resulted in its turn in an increased demand for foreign currency on the exchange market, thus setting off a further inflationary spiral. The consequence is that prices of goods are now quite beyond the means of most Iraqi families, particularly wage and salary earners living on fixed or semi-fixed incomes. It may be noted

that, according to the most recent statistics, the salary of a university graduate in his first job is no more than 165 dinars, whereas the prices of goods have risen as shown in the following table:

Item	Price (in dinars)		Price increase (percentage)
	June 1990	December 1992	
Lamb (1 kg)	7	75	1 000
Chicken (1 kg)	2.4	60	2 500
Eggs (1 tray)	2.5	50	1 016
"Nido" powdered milk (2 kg)	4.5	250	5 000
Tomato concentrate (1 tin)	4.3	15.8	367
Tea	2	80	4 000
Sugar (1 kg)	0.4	12	3 000
Wheat flour (1 kg)	0.1	8	8 000
Four-ring gas cooker	204.2	4 800	2 300
12 V car battery	22.5	1 000	4 500
Car tyre	21.9	2 000	9 000
Cotton fabric	3.2	30.4	637
Water cooler	145	5 000	3 500

21. The table above shows the extent of the difficulties being encountered by the Iraqi people in endeavouring to subsist. The prices of the items in the table are given as an illustration, but there are others whose prices have risen still further. For example, the price of a rear tyre for a medium-sized agricultural tractor has risen from about 150 dinars in June 1990 to over 5,000 dinars today, while that of treated seed has increased by the same proportion, or even more so. This inflation has repercussions on the cost of production, so that the State has found itself obliged to raise the prices paid to farmers accordingly in order to stimulate production.

22. The ration card system has helped to maintain essential food supplies at the same prices as before the blockade. The prices of electricity, medicines, drinking water and oil products have remained unchanged. Without these measures, Iraqi society would no doubt have faced complete collapse.

23. Despite all these efforts, consumer prices were on average some 508 per cent higher in July 1992 than in 1990 and food prices 614 per cent higher. These figures reflect the serious impact of the blockade, despite the efforts being made by the Government to maintain the prices of the range of essential goods and services mentioned above.

24. It is worth noting that the total wage-bill for the national economy was 33.6 per cent higher in 1991 than in 1990, whereas consumer prices increased over the same year by an average of 255 per cent. Thus the real purchasing power of the labour force as a whole fell by 65 per cent over the

year. It is easy to imagine the difficulties that will arise during the last quarter of 1993 and the situation that will exist if the blockade is maintained.

25. Impact of the economic blockade on installations

The economic blockade imposed on Iraq since August 1990 has had a direct impact on all sectors of the economy. Its most evident consequences have been, apart from the cessation of oil exports and imports of oil products, the total or partial shut-down of plant and higher operating costs. At the same time, it has been necessary to pay interest on foreign loans and investments, although the implementation of projects scheduled under the development plan has been delayed. Total losses suffered during the period from 1 March 1991 to 1 April 1992 have been estimated at 12,460,076,392 Iraqi dinars (1 Iraqi dinar is equal to about 3.28 dollars).

26. Effects of the ban on scheduled civil flights by Iraqi Airways planes carrying passengers, medicines and goods to and from Iraq

We wish to draw the international community's attention to a matter which obviously bears directly on human rights in Iraq, inasmuch as the constant problems it creates have negative repercussions on all strata of the Iraqi population in different sectors, namely, the right to access to medicines and food, and other rights, such as the right to freedom of movement.

27. Since the start of the aggression against Iraq, on 17 January 1991, Iraqi Airways has not been authorized to make scheduled flights carrying passengers or goods to or from Iraq. Iraq, on the other hand, without regard to the purpose of these flights, has made considerable efforts to get the Sanctions Committee established by the Security Council to authorize Iraqi aircraft to resume their flights, but these efforts have been fruitless because of the obstinacy of certain Powers which take the decisions in the Security Council.

28. While stressing that it is not our intention to deal with the political aspects of this question, which involve the arbitrary nature of the interpretation and application of the relevant Security Council resolutions on Iraq, we wish to draw attention to certain truths relating to the humanitarian aspects of the matter, which have directly affected Iraqis' enjoyment of the most elementary rights set forth in international human rights instruments.

29. There is only one route for travelling to and from Iraq and transporting goods and medical supplies into the country, the highway to Amman, which is 1,000 km long. The journey takes 17 hours.

30. Obviously, the travellers include sick and elderly people and children, for whom the highway cannot provide the necessary services. The length of the journey also causes problems for the carriage of certain medical supplies which need to be transported quickly and with special means of conservation, for which carriage by land is not suitable, not to mention the delays caused in the transport of foodstuffs to Iraq and their direct repercussions on Iraqis' daily lives.

31. This painful situation has caused innumerable deaths among the sick and elderly and infants, who are not strong enough for long overland journeys, particularly since most of them are going to Jordan for treatment. In addition, the heavy traffic on the road has increased the number of accidents and deaths. All this could have been avoided if Iraqi aircraft had been authorized to resume their flights, if only for humanitarian reasons.

32. We should also like to raise another humanitarian question, concerning the staff of Iraqi Airways. These people, who number some 3,000 and have 20,000 people to support, have been unemployed for the last two years because of the ban on flights by Iraqi Airways.

33. There is a further important point worth making: the immobilization of Iraqi aircraft at the airports for two years will leave them unusable wrecks. It was with that end in mind that the Americans refused to let these aircraft be transferred to Amman or Baghdad for maintenance.

34. All the foregoing constitutes a flagrant violation of the civil, political, economic and social rights set forth in the two international covenants and in the Universal Declaration of Human Rights. In the conviction that the international community cannot turn its back on this situation, we express the hope that it will take positive steps to alleviate the suffering and ensure the application of the international covenants.

Damage caused to the environment in Iraq by the aggression of the 30 coalition States and its impact on human rights

35. The environment in Iraq has suffered the worst forms of destruction that can be inflicted in this day and age as a result of the savage and intensive bombing carried out by the coalition States. This devastation has destroyed all the branches of the economic infrastructure of the country - industry, petroleum, agriculture and services. The activities of these sectors have been paralysed, with disastrous consequences for public health and the environment. Thus, all the constituent parts of the environment - air, water and soil - have been devastated, directly or indirectly, by this aggression, as the following description shows.

State of the environment in the petroleum sector

36. The coalition aggression targeted the various petroleum enterprises and facilities at all levels - production, refining and distribution - bringing about the destruction of the installations and degradation of the environment. The heavy bombing of oilfields and refineries ignited enormous quantities of crude petroleum or caused it to be discharged on to adjoining land and surface water (16,898,591 barrels). The bombing of storage facilities and pipelines set fire to 373,023 m^3 of petroleum products. The bombing and destruction, in all regions of Iraq, of petroleum refineries, which include industrial water treatment plant, caused the outflow and discharge of 22,320 m^3 of polluted waste per day on to adjacent land and surface water. Moreover, owing to the stoppage of the sulphur production units in the petroleum installations, 80 million cubic feet (2.25 million m^3) of natural gas and 30 million m^3 of hydrogen sulphide were burned. In addition, the bombing and destruction of

Iraqi tankers and ports caused substantial amounts of crude petroleum to be discharged into the waters of the Arabian Gulf and serious damage to the marine environment in Iraq.

State of the environment in the industrial sector

37. Iraq's industrial installations were directly targeted by the bombing. Many were destroyed and the rest were badly damaged. The bombing of industrial installations that use various poisonous and dangerous chemical substances caused substantial amounts of these products to be discharged into the surface water and soil, and other amounts to seep into underground water and to vaporize and be disseminated into the atmosphere, killing fish and some of the wild fauna and flora (table 1 annexed hereto shows the amounts and types of these poisonous or dangerous substances). Furthermore, substantial amounts of petroleum products used in industry were discharged. It is estimated that the volume of petroleum products set on fire was 65 million litres - including 24 million litres of heavy oil and 39 million litres of fuel oil - causing atmospheric pollution due to the accumulation of poisonous fumes and gases. As a result of the bombing, the liquid, solid and gaseous waste treatment plants in these installations were destroyed, causing various industrial wastes to be spilled into the environment. This phenomenon is continuing at the present time, despite the restarting of certain factories, since the iniquitous economic embargo imposed on Iraq prevents it from obtaining the mechanical and electrical supplies needed for the reconstruction or repair of these plants. In addition, the destruction of the electric power plants and the breakdown in the supply of electricity had direct repercussions on the operation of public services, preventing the country from satisfying the vital daily needs of its citizens. This also caused breakdowns in the refrigeration equipment of cold-storage depots in the different administrative areas. Foodstuffs, such as red and white meat, have been spoiled as a result, thereby aggravating the food shortage.

State of the environment in the agricultural services sector

38. Most agricultural projects in Iraq sustained direct damage as a result of the allied aggression. The bombing and the movement of military equipment by the coalition States and the laying of mines in the southern part of the country destroyed the environment of the desert areas, the natural grazing land and the vegetation cover. Military operations in all their forms conducted in the desert areas destroyed the tilth, caused wind erosion of the soil and the formation of moving dunes and damaged 18,978,614 dunams of desert land. The disappearance of the vegetation cover of the desert environment led to the proliferation of rodents - mice and rats - and wild boar, which have attacked the crops causing heavy losses. The ecological damage caused in Iraq by the allied aggression was described in an official report by the United Nations Environment Programme (UNEP), following a visit by a UNEP delegation to Iraq from 17 to 24 August 1991. The burning of petroleum tankers and installations and the ensuing crude oil spillage caused thick clouds of black smoke, the formation of black and acid rain and atmospheric pollution over the whole country. This acid rain has contaminated the soil, destroyed the vegetation cover throughout the country and adversely affected harvests and market-gardening production.

39. A number of agricultural projects aiming at environmental protection and sanitation - in particular desertification control, desert reclamation, land improvement and water quality control inside Iraq - have been suspended, owing to lack of energy supplies, suspension of financing by international organizations as a result of the continuing embargo imposed on the country and shortage of spare parts.

40. The discharging into the waterways of chemical substances as a result of the bombing of petroleum installations and factories has had harmful repercussions on aquatic life and irrigation water. The bombing has also caused a shortage of fuel, obliging the population to cut down trees for domestic fuel, mainly for cooking. This has led to a reduction in the wooded areas and an increased risk of desertification, with foreseeable climatic effects. The bombing of dams and dykes has reduced the capacity to contain tidal waves, with the ensuing risk of flooding of extensive areas of land and ecological disaster. It has also reduced the amounts of water stored in the main structures, thereby cutting down the amount of cultivable land. The following table shows the declines recorded in Iraq for three major crops:

Crop	Area scheduled for cultivation (in thousand dunams)	Area planted (in thousand dunams)	Loss (percentage)
Rice	400	200	50
Sunflower	250	35	87
Soya	10	0.2	98

41. The destruction of electric power stations caused a stoppage of the pumping stations which diverted drainage water from the secondary circuits to the main circuits, producing a rise in the level of this water and causing it to ebb towards the land that had been drained. This land has reverted to its original salinity and extensive areas (4,762,625 dunams) have been damaged.

42. As a consequence of the allied aggression and the continuing embargo, the livestock population has declined steadily. The statistics show that animal production has dropped sharply from the levels that prevailed before the aggression, as the following table shows:

Statistics drawn up before the aggression	Current statistics
9.4 m head of sheep and goats	Less than 50% of previous figures
1.6 m head of cattle	Less than 6% of the previous figures
35.7 m chickens for meat production (all ages)	0
10.5 m laying hens (all ages)	2 million
250 m eggs for hatching (for import)	Quantity imported: 0
32,000 tonnes/year of poultry feed	0
1,684 fish farms	237 (mainly because of the lack of fish food)

43. In view of the circumstances of the aggression and the ban on crop-spraying aircraft operating in the northern zone of the country, the wheat and rye crops have been invaded by a parasite. Enormous losses have been recorded in respect of the crops and vermin have spread in the central area. The extent of the damaged caused to the environment in Iraq was highlighted in the reports of the two United Nations emissaries who visited Iraq after the allied aggression, Prince Aga Khan and Mr. Ahtisaari, as well as in the reports by a group of alumni of Harvard University ("the Harvard Team") and Médecins Sans Frontières.

Annex I

Quantities of chemical substances, including dangerous or poisonous substances, that have been discharged

Installations	Quantities	Substances
State Sugar Refinery, Missan	95 191 kg	Pesticides
State Organization for Geological and Mining Surveys	7 874 kg	Mercuric nitrate and potassium nitrate, mercuric chloride, arsenic oxide, potassium cyanide, ammonium thiocyanide and potassium thiocyanide
	2 litres	Concentrated solutions of sulphuric acid and nitric acid
Iraqi State Cement Factory	4.5 kg	Ammonium thiocyanide and potassium thiocyanide, potassium nitrate
State Organization for Fertilizer Production	700 tonnes	Ammonia
State Organization for Phosphates	5 606 tonnes	Concentrated solution of sulphuric acid
	5 000 tonnes	Concentrated solution of phosphoric acid
	180 tonnes	Fluosilicic acid
	53 600 tonnes	Liquid sulphur dioxide
State Organization for Electricity (Production and Transport)	1 350 kg	Alun
	150 tonnes/200 litres	Hydrochloric acid
	1 360 litres	Anti-rust solution
	75 kg	Polyelectrolyte
	164 tonnes	Caustic soda

Installations	Quantities	Substances
State Organization for Pharmaceutical Products and Medical Supplies	200 tonnes	Polythene and polypropylene
	100 tonnes	Wrapping and packaging products
Al-Nu'man Factory	328 371 kg	Plastics (granules and residue)
	7 476 kg	Pigments
	400 kg	Fibre-glass
	67 500 m	Low-density polyethylene pipes
	6 960 kg	Resin
	350 kg	Solid and liquid wax
	19 925 kg	Black graphite
	600 kg	Dyes
	500 units	Used tyres